

Notice of Allowability

Application No.

10/679,726

Examiner

Hashem Farrokh

Applicant(s)

HAASE ET AL.

Art Unit

2187

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 11/1/07.
2. ☒ The allowed claim(s) is/are 1-4,8-11 and 15 Renumbered 1-9.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☐ All b) ☐ Some* c) ☐ None of the:
 1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☐ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit
of Biological Material
5. ☐ Notice of Informal Patent Application
6. ☐ Interview Summary (PTO-413),
Paper No./Mail Date _____
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 11/1/07 has been entered.

EXAMINER'S AMENMENT

The Examiner initiated a telephone call to inform the Applicant, Mr. Carl A. Giordano (Reg. # 41,780) that the new amendment of the independent claims 1, 8, and 15 does not put the application on a condition for allowance. The Examiner inquires whether the Applicant is willing to include the "Copy-On-Demand process" feature taught in the specification into the claims. The Examiner stated that Patent Application No. 10/679,662 now the Patent No. 7,188,223 B1 (with a common assignee and inventors) included similar limitations that is not taught in the prior art. The Applicant agreed and amended the claims and emailed a copy of newly amended claims to the Examiner and authorized the Examiner to include the changes in an examiner's amendment (a copy of the emailed amendment is attached). An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee

Please make the following amendment:

Claim 1:

Line 8, after "source," insert --in a copy-on-demand process,--

Line 12, replace "providing clone data during restoring step" with --that is providing said clone data--

Claim 8:

Line 10, after "source" insert --in a copy-on-demand process:--

Line 14, replace "providing clone data during restoring step" with --that is providing said clone data--

Claim 15:

Line 11, after "source," insert --in a copy-on-demand process,--

Line 15, replace "providing clone data during restoring step" with --that is providing said clone data--

REASONS FOR ALLOWANCE

The following are the Examiner's statements of reasons for allowance:

The prior art does not teach or suggest the combination and relationship between these features:

1. *The primary reasons for allowance of claims 1-4, 8-11, and 15 in the instant application is the combination with the inclusion of the following limitations: **restoring***

the source by copying data content from the clone to overwrite the data content of the source in a Copy-on-Demand process, allowing host reads and writes to the source; if preserving the data content of the clone is not selected, then during the restoring step overwriting the data contents of the clone that is providing said clone data and determining extents of the source affected by any host write request; and if any extents affected by the host write request are involved during the restoring step and preserving is not selected, allowing the host writes to be processed as soon as the required extents have been copied from the clone to the source, and setting an indicator to indicate that the extents need to be re-copied.

Conclusion

Any inquiry concerning this communication should be directed to Hashem Farrokh whose telephone number is (571) 272-4193. The examiner can normally be reached Monday-Friday from 8:00 AM to 5:00 PM.

If attempt to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Donald A Sparks, can be reached on (571) 272-4201.

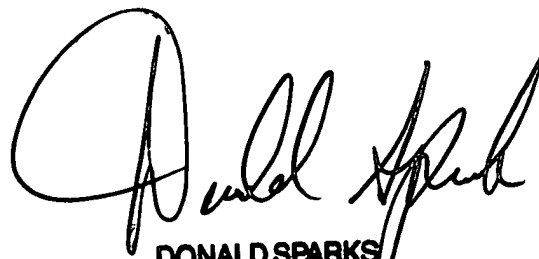
Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published application may be obtained from either private PAIR or Public PAIR. Status information for unpublished application is available through Private PAIR only. For more information about PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on

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*access to the Private PAIR system, contact the Electronic Business Center (EBS) at
866-217-9197 (toll-free).*

~~HR~~
HF

2007-12-03



DONALD SPARKS
SUPERVISORY PATENT EXAMINER